

## Claims

### What is claimed is:

1. A method for decreasing cartilage abnormalities in an animal in need of such decrease which comprises systemically administering to said animal a cartilage abnormality decreasing effective amount of a combination of at least one sulfur containing amino acid and manganese.
2. A method in accordance with claim 1 wherein the animal is prevented from having or has a condition selected from the group consisting of osteoarthritis, rheumatoid arthritis, osteochondrosis, degenerative joint disease, synovitis, bacterial purulent arthritis, osteoarthropathia, and psoriatica.
3. A method in accordance with claim 1 wherein at least one sulfur containing amino acid is selected from the group consisting of D-methionine, L-methionine, DL-methionine, D-cysteine, L-cysteine, DL-cysteine, D-cystine, L-cystine, DL-cystine, S-adenosylmethionine, betaine, beta-hydroxy analog of methionine, and manganese methionine.
4. A method in accordance with claim 1 wherein the minimum quantity of amino acid is about 1.2 wt% and the minimum amount of manganese is about 50 ppm.
5. A method in accordance with claim 1 wherein the administration is oral.
6. A composition suitable for systemic administration to a animal comprising a cartilage abnormality decreasing amount of a combination of at least one sulfur containing amino acid and manganese in association with a carrier.
7. The composition in accordance with claim 6 wherein at least one sulfur containing amino acid is selected from the group consisting of D-methionine, L-methionine, DL-methionine, D-cysteine, L-cysteine, DL-cysteine, D-cystine, L-cystine, DL-cystine, S-adenosylmethionine, betaine, beta-hydroxy analog of methionine, and manganese methionine.
8. The composition in accordance with claim 6 wherein the administration is oral.
9. The composition in accordance with claim 6 wherein the minimum quantity of amino acid is about 1.2 wt% and the minimum amount of manganese is about 50 ppm.

10. A method for preventing degradation of cartilage tissue in an animal in need of said prevention which comprises administering to the said animal, a cartilage degradation prevention effective amount of at least one sulfur containing amino acid and manganese.
- 5 11. The method in accordance with claim 10 wherein the animal is prevented from having or has a condition selected from the group consisting of osteoarthritis, rheumatoid arthritis, osteochondrosis, degenerative joint disease, synovitis, bacterial purulent arthritis, osteoarthropathia, and psoriatica.
- 10 12. The method in accordance with claim 10 wherein at least one sulfur containing amino acid is selected from the group consisting of D-methionine, L-methionine, DL-methionine, D-cysteine, L-cysteine, DL-cysteine, D-cystine, L-cystine, DL-cystine, S-adenosylmethionine, betaine, beta-hydroxy analog of methionine, and manganese methionine.
- 15 13. The method in accordance with claim 10 wherein the minimum quantity of amino acid is about 1.2 wt% and the minimum amount of manganese is about 50 ppm.
14. The method in accordance with claim 10 wherein the administration is oral.
- 20 15. A method for enhancing cartilage development in an animal which comprises administering to the said animal an enhancing cartilage development effective amount of at least one sulfur containing amino acid and manganese.
- 25 16. A method for preventing disease associated with cartilage degradation in an animal which comprises administering to the said animal an enhancing cartilage development effective amount of at least one sulfur containing amino acid and manganese.
- 30 17. A method for treating disease associated with cartilage degradation in an animal which comprises administering to the said animal an enhancing cartilage development effective amount of at least one sulfur containing amino acid and manganese.